In conclusion I beg to tender my thanks to Dr. James Ritchie, the superintendent of the laboratory, for his ever ready assistance, and to Dr. J. A. Murray, of the Imperial Cancer Research, for his helpful suggestions.

¹Unna's *Monatshefte*, 1906. ²BRITISH MEDICAL JOURNAL, July 22nd, 1911.

REFERENCES.

HYDROCEPHALUS AS A SEQUEL TO SHOCK.

BY

A. KEITH ARMSTRONG, M.R.C.S., L.R.C.P.,
MONMOUTH.

THE following case presents several unusual features. The connexion between the initial shock and the condition of the nervous system found *post mortem* seems somewhat doubtful, though clinically the whole illness could be traced to the accident, before which he was strong and healthy. Immediately afterwards he could be accurately described as a nervous wreck. I very much regret that a lumbar puncture was not performed, and though this was considered it was not until the patient's condition was so bad that it would have been of no value. The absence of headache was an unusual feature, and although the intracranial pressure must at some time have been considerably increased, it was absent throughout the illness.

The patient, a man aged 54 years, by occupation a cowman, and accustomed to handling cattle all his life, both in this country and in New Zealand, of temperate habits and enjoying good health, was, on April 19th, 1911, knocked against a fence by a bull, and received a bruise on the right side of the chest. He complained of no other injury, but said he felt upset. He walked home unassisted, a distance of about 120 yards. He remained at home feeling very shaky, and suffering some pain from the bruise on his chest.

Four days later I saw him for the first time, and found a bruise on the right lower costal cartilages. This was the full extent of his injury, and was unimportant, but he was markedly nervous, starting when spoken to quickly, with tremors of hands sufficient to cause some difficulty in feeding. The knee-jerks were normal. He could give a clear account of the accident, which had been a great mental shock to him. He said that he thought the bull was going to kill him, which, indeed, seemed likely, and he had, in fact, a very narrow escape of his life.

Under treatment by rest, potassium bromide, and later by tonics, nux vomica, and lecithin, he slowly improved, and at the end of May, by my advice, went away to stay with a relative; when he returned home, three weeks later, although better, he was quite unfit for his work, still being very nervous, and himself stating that he was too frightened to resume his work among the cattle. For nearly four months he remained more or less *in statu quo*, taking his food well, sleeping well, complaining of no pain, and taking a certain amount of daily exercise, but still in a highly nervous state. Early in October he suddenly became much worse. The tremors of the hands increased and a slight tremor of the lips and tongue was present; all the reflexes were increased, ankle clonus was present, with some rigidity of the lower limbs. The plantar reflex was flexor and always remained so; the pupillary reactions were normal. His mental state was one of extreme anxiety about his condition.

During the next fourteen days he slowly got worse, with a slight increase of the rigidity, and showing some mental confusion, but still eating and sleeping well. The urine was free from albumen and sugar.

A further progress in the downward grade of the case now became evident, and on October 19th he was unable to get up. Reflexes were greatly increased. The whole body sharing in the rigidity of the lower limbs, he was unable to raise himself to a sitting posture, and when assisted on to his feet was unable to stand alone; but rather curiously he seemed able to maintain his balance while moving, and could walk fairly well. The optic discs were normal in appearance. His mental state was one of confusion with slow cerebration. The face presented a rather vacant appearance, quite unlike his usual expression. Sensation was normal.

From this time on he continued steadily to get worse, although his mental state varied from time to time, sometimes being quite clear and sometimes confused, and noisy, talking, picking at the bedclothes, etc. On some occasions micturition was involuntary, and occasionally, at irregular intervals, profuse sweating occurred without any alteration in the temperature. He took nourishment well, and obtained a sufficient amount of sleep, at irregular intervals. The temperature remained about normal, only varying between 97° and 98°. There was some catarrh in the lungs, with a good deal of expectoration, and it soon became evident that this condition was likely to become of vital influence in the case; and on November 5th the temperature rose to 103°, accompanied by a corresponding increase in the pulse-rate.

He now rapidly became weaker, and, in spite of the exhibition of stimulants, etc., he died from exhaustion on November 9th.

Necropsy.

Externally, over the sacrum was a reddened, inflamed patch, about the size of the palm of the hand, presenting the appearance of the commencement of a bed sore. There was no sign of injury to the ribs or adjacent structures. The right side of the heart was slightly dilated, otherwise normal, and the lungs were much congested and oedematous. All the abdominal viscera were healthy. The dura mater and arachnoid appeared to be normal. The convolutions were slightly flattened. On opening the brain it was seen that some dilatation of the ventricles was present. The ependyma seemed healthy. On the spinal canal being opened, there was a considerable excess of fluid found, the cord itself appearing normal to the naked eye.

Such a sequel to a nervous shock is rare, but it occurs to me that the condition of hydrocephalus which supervened may be more than a coincidence.

Memoranda:

MEDICAL, SURGICAL, OBSTETRICAL.

NERVOUS RETENTION OF URINE.

IN the BRITISH MEDICAL JOURNAL of January 13th, p. 72, Dr. Harford Edwards has suggested a rectal injection of glycerine in cases of retention of urine—hysterical and after labour.

I find that these injections occasionally fail to produce the desired result. For the last ten or twelve years I have ordered a simple enema, not less than Ojss, which has never failed me, the rectum and bladder emptying themselves at the same time. The advantage of not having to pass a catheter after parturition is obvious.

London, N.

FREDERIC C. WOOD, L.M.S., D.P.H.

ABSCESS OF THE SPLEEN COMPLICATING
MALARIA.

IN no book that I have been able to consult is abscess of the spleen—at least of any size—mentioned as a complication of malaria. Some notes, therefore, on a case in which a large abscess was found may prove of interest.

H., an Indian male, aged 25, came to hospital in Gyantse, Tibet, complaining of attacks of shivering, pain in the abdomen and general weakness. He stated that he had been in perfectly good health until a month before, when, while passing through Sikkim, he was suddenly seized with violent shivering; this passed off in a few days, but ever since this attack he had noticed that he was considerably weaker and that his abdomen was swollen.

On admission on June 8th, 1911, the temperature was 101° F., pulse 90, and respirations 33. The spleen was considerably enlarged, its lower limit reached to within a quarter of an inch of the umbilicus, and in addition the organ projected markedly forward, forming a very evident prominence above the umbilicus. Under treatment with quinine the fever rapidly subsided and the patient was discharged on June 22nd.

I saw him frequently after this date and was able to diagnose malignant tertian malaria. He seemed to be progressing favourably until August 25th, when I was suddenly sent for as the patient "was in a fit." I found him suffering from violent convulsive spasms associated with coma, the case closely resembling one of tetanus. Under energetic treatment with quinine these symptoms subsided, leaving complete aphasia and great weakness. The aphasia passed off in seven days.

After the attack the patient, although he had no actual rise of temperature, began to complain of severe pain over the region of the spleen, which perceptibly enlarged. Various remedies were tried to relieve the pain but with little success. The patient persisted in saying that there "was something inside the spleen," but, although a careful examination was made, nothing definite could be made out. It seems extraordinary that such a large abscess as was eventually discovered could be present in the spleen without causing any rise of temperature or increase in pulse-rate, in fact, without causing any symptoms except pain.

As the pain increased, a needle was inserted into the most prominent part of the spleen; a little pus escaped. Next day I opened the abdomen under chloroform, and discovered a large abscess occupying the anterior half of at least the lower half of the spleen. There was no cyst wall encapsulating the pus, and the rest of the spleen appeared comparatively healthy. About 8 fluid ounces of pus escaped, leaving a ragged cavity in the spleen. This was explored with the finger for further collections of pus, and, none being found, a drain was inserted and the patient put back to bed. He stood the operation well, and looked much better next day. Blood films from the ear taken at the time of the operation revealed no parasite; films of pus from the spleen showed a bacillus apparently identical with *B. coli*.

For six days after the operation his temperature was normal,